

Spatiotemporal patterns of unburned areas within fire perimeters in the northwestern United States from 1984 to 2014

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Research Objective

Analyze an unburned islands database to examine spatiotemporal trends in fire refugia occurrence

Methods

- Establish unburned island database for approx. 2300 fires
- Analyze spatial and temporal characteristics of unburned islands across different ecotones

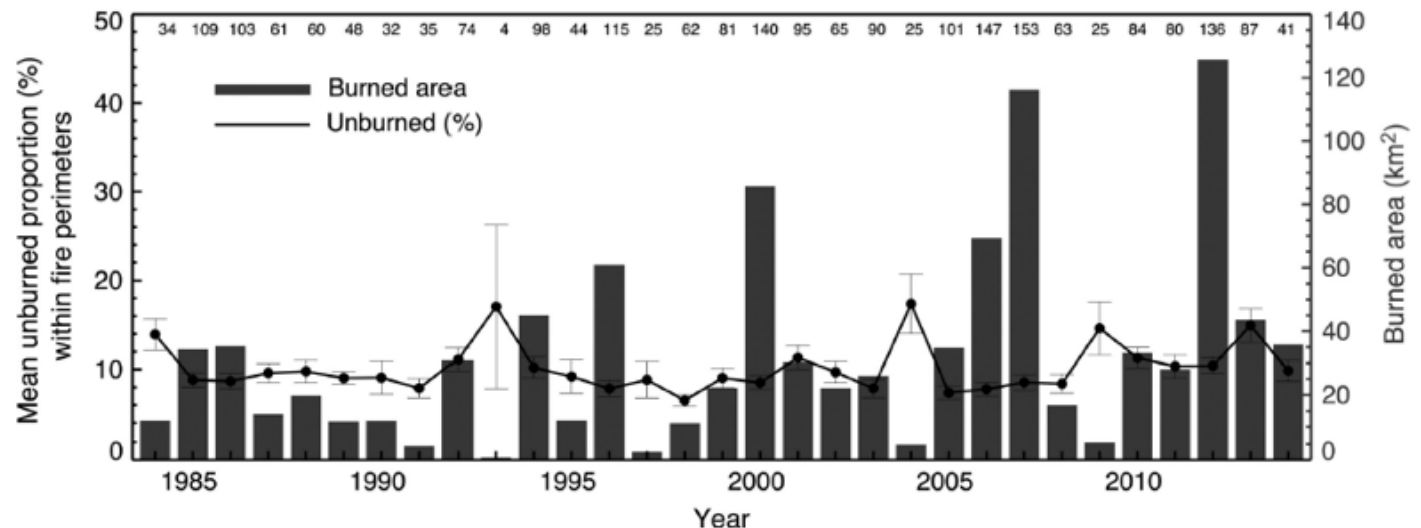


Fig. 2. Total fire extent (km², bars) and mean proportion unburned within fire perimeters (% , line) across the inland northwest from 1984 to 2014. The error bars represent the standard error, and the number of fires is shown across the top.

Results & Implications

- We found that unburned area proportion exhibited no change from 1984-2014, suggesting that recent trends in area burned and overall severity have not affected fire refugia (fig 2)
- There were ecoregional differences in unburned island characteristics, suggesting influences of vegetation and topography on the formation of unburned area